2004 Annual Water Quality Report

This annual report contains information about the quality of the water supplied by the U.S. Navy Water System during the period of January 1st to December 31st, 2004. Included as part of this report is a table entitled "***2004 U.S. NAVY WATER QUALITY DATA***", which provides details on the water quality of our system.

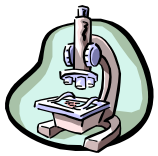
This report will help you, our customer, understand the relationship between the contaminants found in drinking water, activities that may contaminate the water supply, and their associated health effects.

THE U.S. NAVY WATER SYSTEM

The Naval Facilities Engineering Command Marianas operates the U.S. Navy Water System with support provided by our BOS contractor, Raytheon Technical Services Guam Inc., and their subcontractor, Earth Tech Inc.

The Fena Reservoir is the primary source of water for the U.S. Navy Water System and is supplemented by the Almagosa and Bona Springs. Water from the reservoir and springs is processed at the Fena Water Treatment Plant before distribution. Our plant was built in the 1950's, but upgrades have been made at our plant to meet the latest EPA water treatment standards. In addition, a total of eleven (11) groundwater wells – three (3) at the Naval Hospital area, two (2) at Barrigada, two (2) at South Finegayan, and four (4) at North Finegayan – further augment our water system.

WHAT ARE DRINKING WATER CONTAMINANTS AND WHERE DO THEY COME FROM?



The sources of drinking water (both tap water and bottled water) include rivers, lakes, streams, ponds, reservoirs, springs, and wells. As water moves over land or through the ground, it dissolves naturally occurring minerals and, in some cases, radioactive material, and can pick up substances resulting from the presence of animals or from human activity. Contaminants that may be present in untreated water include:

- *Microbial contaminants*, such as viruses and bacteria, which may come from sewage treatment plants, septic systems, agricultural livestock operations, and wildlife;

- *Inorganic contaminants*, such as metals, which can be naturally occurring or result from urban storm runoff, industrial or domestic wastewater discharges, oil and gas production, mining, or farming;

- *Pesticides and herbicides*, which may come from a variety of sources such as agriculture, urban storm water runoff, and residential uses;

- *Radioactive contaminants*, which can be naturally occurring or be the result of oil and gas production and mining activities;

- *Organic chemical contaminants*, including synthetic and volatile organic chemicals, which are by-products of industrial processes and petroleum production, and can also come from gas stations, urban storm water runoff, and septic systems.

Drinking water, including bottled water, may reasonably be expected to contain small amounts of some contaminants. The presence of contaminants does not necessarily indicate that the water poses a health risk. More information about contaminants and potential health effects can be obtained by calling EPA's Safe Drinking Water Hotline (1-800-426-4791).

Navy Water Quality

U.S. EPA and Guam EPA set Maximum Contaminant Level (MCL) standards that limit the amount of certain contaminants in drinking water. Meeting these standards ensure that the tap water we provide to you is both safe and aesthetically pleasing to drink. These are further explained in the sections below.
[Please refer to the corresponding sections of the Water Quality Data Tables]

I. PRIMARY DRINKING WATER STANDARDS

National Primary Drinking Water Regulations set limits for contaminants in drinking water and standards for water treatment that primarily safeguard health. All drinking water samples from the U.S. Navy Water System met all primary drinking water Maximum Contaminant Level (MCL) standards in 2004.

II. SECONDARY DRINKING WATER STANDARDS (AESTHETICS)

National Secondary Drinking Water Regulations are non-enforceable guidelines for limiting the contaminants in drinking water that affect its aesthetic quality (i.e. taste, smell, appearance, staining properties, etc.). Our drinking water may at times contain various aesthetic parameters above their recommended acceptable levels. While these parameters directly affect the aesthetic quality of your drinking water, they do NOT pose a health hazard. The Navy's distribution system undergoes systematic and routine waterline flushing to help maintain the highest aesthetic quality of your drinking water.

III. MONITORING REQUIREMENTS

In the following, our system did not satisfy a requirement as set by the National Primary Drinking Water Standards:

In April 2004, when continuous residual disinfectant (chlorine) monitoring equipment failed, the U.S. Navy Water System continued to take grab-samples and analyze for residual disinfectant levels past the allowable five (5) working days until the continuous monitoring equipment was finally restored back into service on 20 April 2004. Regulations only allow for water systems to grab-sample and analyze in lieu of continuous monitoring for not more than five (5) working days. This requirement was not met. All throughout this episode, tests that were conducted did not detect the presence of disease-causing organisms in our water. The interruption of continuous monitoring impedes our ability to determine whether the water is being treated adequately at all times. Operation and maintenance of the continuous monitoring equipment has now been streamlined to prevent future occurrences.

In September 2004, Total Coliform samples were not collected and analyzed at five (5) sites located within the Apra Harbor Naval Complex. Water systems are required to sample and analyze for Total Coliform (bacteria) at all sites specified in a written sampling plan. This requirement was not met. Although we did not take these samples, the U.S. Navy Water System still complied with the required minimum number of samples to be collected. Non-collection was attributed to changes in sample collection personnel at that time. Additional training has been provided to all personnel to ensure full compliance with this monitoring requirement in the future.

How Can You Report A Water Quality Complaint?

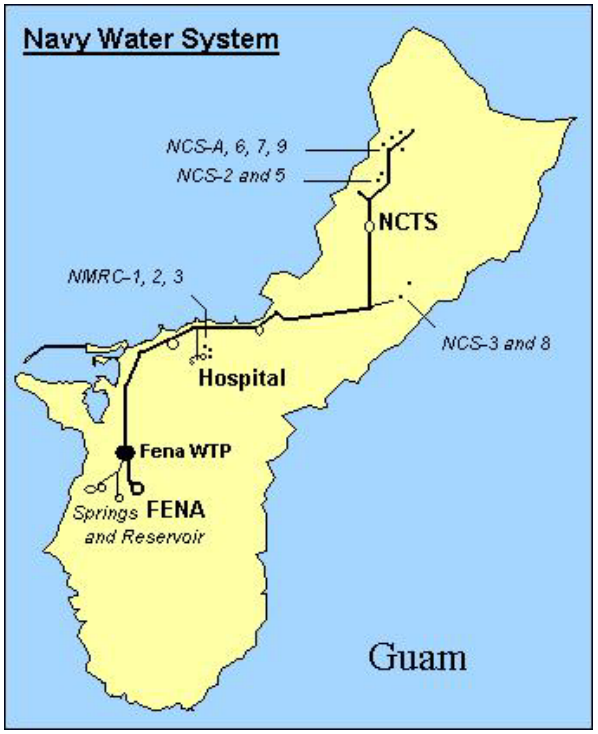
Should you notice that your water is discolored, or if you have any concerns about your drinking water, we strongly encourage you to call our *Work Control Center Trouble Desk* at **333-2011**. Arrangements can then be made to have your water sampled and analyzed to ensure that it is safe to drink.

Health Precautions

Some people may be more vulnerable to contaminants in drinking water than the general population. Immuno-compromised persons such as cancer patients undergoing chemotherapy, persons who have undergone organ transplants, people with HIV/AIDS or other immune system disorders, and some elderly or infants, can be particularly at risk from infections. These people should seek advice about drinking water from their health care providers. EPA/CDC guidelines on appropriate means to lessen the risk of infection by Cryptosporidium and other microbial contaminants are available from the Safe Drinking Water Hotline (800) 426-4791.

HOW CAN YOU OBTAIN ADDITIONAL INFORMATION?

For additional information about the U.S. Navy Water System or this report, please feel free to call Raytheon Technical Services Guam Inc. (RTSG) Environmental Compliance Office at **339-8023**, the Naval Facilities Engineering Command Marianas, Environmental Services Department at **339-4100**, or the Guam EPA Safe Drinking Water Program at **475-1660/1**.



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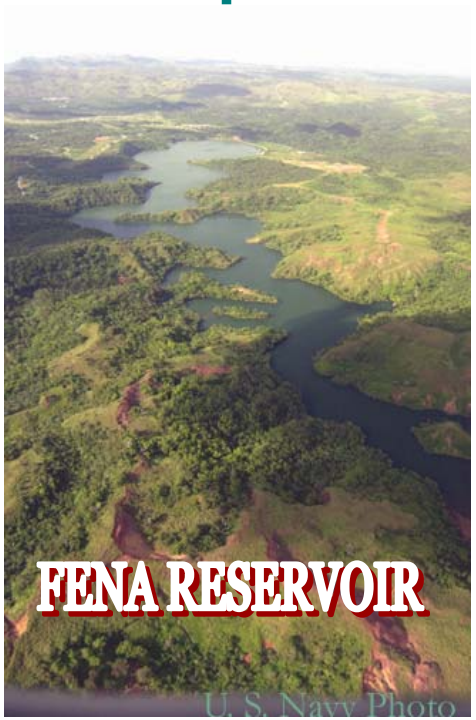

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